### **Comparisons of Job Characteristics**

Focus Occupation: Surgical Technologists (29-2055) **Associated Occupation: Registered Nurses (29-1111)** 

Compare Knowledge Compare Skills Compare Abilities **Compare Detailed Work Activities** Compare Tools and Technologies

| << | Focus occupation element is much lower             |
|----|--|
| <  | Focus occupation element is lower                  |
| 0  | Focus occupation element is at a similar level     |
| >  | Focus occupation element is at a higher level      |
| >> | Focus occupation element is at a much higher level |

### Knowledge

Similarity of Focus Occupation to Associated Occupation: 85

Focus Occupation: Surgical Technologists (29-2055) Associated Occupation: Registered Nurses (29-1111)

| Associated Occupation's<br>Key Knowledge Elements | Average<br>Rating, All<br>Occupations | Associated<br>Occupation's<br>Rating | Focus<br>Occupation's<br>Rating |    | Evaluation of Focus Occupation                      |  |
|---|---------------------------------------|--------------------------------------|---------------------------------|----|---|--|
| Psychology  | 6.4                                   | 19.5                                 | 10.3                            | << | Extensive education and/or training may be required |  |
| Customer and Personal Service                     | 11.3                                  | 18.5                                 | 13.2                            | << | Extensive education and/or training may be required |  |
| Medicine and Dentistry                            | 3.7                                   | 17.8                                 | 15.2                            | <  | Expanded education and/or training may be required  |  |
| Therapy and Counseling                            | 3.8                                   | 16.2                                 | 6.1                             | << | Extensive education and/or training may be required |  |
| Education and Training                            | 9.2                                   | 14.7                                 | 10.9                            | << | Extensive education and/or training may be required |  |
| Biology   | 3.7                                   | 13.3                                 | 9.2                             | << | Extensive education and/or training may be required |  |
| Sociology and Anthropology                        | 4.1                                   | 12.1                                 | 4.6                             | << | Extensive education and/or training may be required |  |
| Chemistry   | 4.8                                   | 9.8                                  | 7.4                             | << | Extensive education and/or training may be required |  |
| Philosophy and Theology                           | 3.2                                   | 9.2                                  | 4.6                             | << | Extensive education and/or training may be required |  |

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

| Skills  | Similarity of Focus Occupation to Associated Occupation: 73 |  |  |  |  |
|---|---|--|--|--|--|
| Focus Occupation: Surgical Technologists (29-2055) Associated Occupation: Registered Nurses (29-1111)   |   |  |  |  |  |
| Associated Occupation's Key Skills Elements  Average Rating, All Occupations Rating Rating  Associated Focus Occupation's Rating  Focus Occupation's Rating |   |  |  |  |  |

| Social Perceptiveness           | 9.1 | 14.9 | 9.4  | << | Extensive development of skills in this area may be required |
|---------------------------------|-----|------|------|----|--|
| Monitoring                      | 9.9 | 13.6 | 11.8 | <  | A higher skill level may be required                         |
| Service Orientation             | 7.9 | 12.7 | 8.7  | << | Extensive development of skills in this area may be required |
| Judgment and Decision<br>Making | 9.4 | 12.5 | 8.4  | << | Extensive development of skills in this area may be required |
| Active Learning                 | 8.7 | 12.2 | 9.1  | << | Extensive development of skills in this area may be required |
| Coordination                    | 9.1 | 12.2 | 11.6 | 0  | Current skill level may be sufficient                        |

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

#### **Abilities**

#### Similarity of Focus Occupation to Associated Occupation: 81

Focus Occupation: Surgical Technologists (29-2055) Associated Occupation: Registered Nurses (29-1111)

| Associated Occupation's<br>Key Abilities Elements | Average<br>Rating, All<br>Occupations | Associated<br>Occupation's<br>Rating | Focus<br>Occupation's<br>Rating |    | Evaluation of Focus Occupation                     |  |
|---|---------------------------------------|--------------------------------------|---------------------------------|----|--|--|
| Problem Sensitivity                               | 11.1                                  | 17.3                                 | 12.9                            | << | Extensive improvement in abilities may be required |  |
| Inductive Reasoning                               | 10.2                                  | 15.3                                 | 9.1                             | << | Extensive improvement in abilities may be required |  |
| Deductive Reasoning                               | 10.6                                  | 14.0                                 | 9.7                             | << | Extensive improvement in abilities may be required |  |
| Speech Recognition                                | 9.9                                   | 13.5                                 | 11.5                            | <  | Some improvement in abilities may be required      |  |
| Information Ordering                              | 9.9                                   | 12.8                                 | 10.8                            | <  | Some improvement in abilities may be required      |  |
| Flexibility of Closure                            | 7.8                                   | 10.9                                 | 10.5                            | 0  | Current ability level may be sufficient            |  |
| Speed of Closure                                  | 5.9                                   | 9.5                                  | 7.3                             | <  | Some improvement in abilities may be required      |  |
| Memorization                                      | 5.6                                   | 8.1                                  | 7.3                             | <  | Some improvement in abilities may be required      |  |

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

## **Activities that Both Occupations Have in Common**

Similarity of Focus
Occupation to Associated
Occupation: 88

Focus Occupation: Surgical Technologists (29-2055) Associated Occupation: Registered Nurses (29-1111)

| Work Activities                        | Exclusivity of Activity |
|--|-------------------------|
| Communicate technical information      | 4                       |
| Follow infectious materials procedures | 52                      |
| Follow patient observation procedures  | 71                      |

| Identify body response variations                         | 57 |
|---|----|
| Inventory medical supplies or instruments                 | 67 |
| Lift or transport ill or injured patients                 | 69 |
| Make presentations on health or medical issues            | 50 |
| Prepare patients for tests, therapy, or treatments        | 70 |
| Prepare supplies or equipment for surgery                 | 89 |
| Take vital signs  | 56 |
| Understand technical operating, service or repair manuals | 6  |
| Use interpersonal communication techniques                | 10 |
| Use knowledge of medical terminology                      | 40 |
| Use sanitation practices in health care settings          | 48 |

Not all positions in these occupations will necessarily perform all of the listed activities. The exclusivity rating is an indication of how unique the activity is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations engage in that activity.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O\*NET (Occupation Information Network) data.

# **Tools and Technologies that Both Occupations Have in Common**

Similarity of Focus
Occupation to Associated
Occupation: 73

Focus Occupation: Surgical Technologists (29-2055) Associated Occupation: Registered Nurses (29-1111)

| Tools and Technologies   | Exclusivity |
|--|-------------|
| Airway management products   | 30          |
| Anesthesia apparatus and accessories and supplies                                | 47          |
| Audio and visual equipment   | 4           |
| Autoclave and sterilizer equipment and accessories                               | 12          |
| Autotransfusion products   | 62          |
| Blood pressure units and related products  | 11          |
| Computers  | 1           |
| Content authoring and editing software   | 1           |
| Data management and query software   | 1           |
| Emergency medical services resuscitation products                                | 15          |
| Endoscopes and accessories and related products                                  | 37          |
| Heat and cold therapy products   | 29          |
| Industry specific software   | 1           |
| Information exchange software  | 1           |
| Intravenous and arterial cannulas and catheters and accessories                  | 29          |
| Medical incision drains and drainage bags and reservoirs and related products    | 70          |
| Medical tissue closure and related products                                      | 47          |
| Medical ultrasound and doppler and echo imaging products                         | 19          |
| Network applications software  | 1           |
| Open heart perfusion equipment and monitors and accessories and related products | 43          |
| Oxygen therapy delivery systems and devices                                      | 13          |
| Patient transport products   | 18          |
| Resuscitation supplies   | 29          |
| Specimen collection and transport containers and supplies                        | 14          |
| Surgical clamps and forceps and surgical ligators and related instruments        | 29          |

| Surgical cutting instruments and snares and related products                       | 24 |
|--|----|
| Surgical equipment and accessories and related products                            | 23 |
| Surgical retractors and related products   | 43 |
| Surgical suction and irrigation cannulas and tips and stylets and related products | 51 |
| Surgical support supplies  | 33 |
| Surgical textiles  | 62 |
| Suture and related products  | 23 |
| Suture and surgical tissue closure instruments and related products                | 33 |
| Syringes and accessories   | 14 |
| Thoracentesis products   | 47 |
| Vascular and compression therapy equipment and supplies                            | 33 |

Not all positions in these occupations will necessarily use all of the listed tools and technologies. The exclusivity rating is an indication of how unique the tool or technology is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations use that tool or technology.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of  $O^*NET$  (Occupation Information Network) data.